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DATE MAILED: 10/20/97

This is a communication from the examiner in charge of your application.
COMMISSIONER OF PATENTS AND TRADEMARKS

OFFICE ACTION SUMMARY

☒ Responsive to communication(s) filed on 7/21/97

☐ This action is FINAL.

☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 D.C. 11; 453 O.G. 213.

A shortened statutory period for response to this action is set to expire 3 month(s), or thirty days, whichever is longer, from the mailing date of this communication. Failure to respond within the period for response will cause the application to become abandoned. (35 U.S.C. § 133). Extensions of time may be obtained under the provisions of 37 CFR 1.136(a).

Disposition of Claims

☒ Claim(s) 1, 5, 9-12 + 14-17 is/are pending in the application.
Of the above, claim(s) _____ is/are withdrawn from consideration.
☐ Claim(s) _____ is/are allowed.
☒ Claim(s) 1, 5, 9-12 + 14-17 is/are rejected.
☐ Claim(s) _____ is/are objected to.
☐ Claim(s) _____ are subject to restriction or election requirement.

Application Papers

☐ See the attached Notice of Draftsperson's Patent Drawing Review, PTO-948.

☐ The drawing(s) filed on _____ is/are objected to by the Examiner.

☐ The proposed drawing correction, filed on _____ is ☐ approved ☐ disapproved.

☐ The specification is objected to by the Examiner.

☐ The oath or declaration is objected to by the Examiner.

Priority under 35 U.S.C. § 119

☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d).

☐ All. ☐ Some*. ☐ None of the CERTIFIED copies of the priority documents have been

☐ received.

☐ received in Application No. (Series Code/Serial Number) _____

☐ received in this national stage application from the International Bureau (PCT Rule 17.2(a))

***Certified copies not received:**

☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e).

Attachment(s)

☒ Notice of Reference Cited, PTO-892

☐ Information Disclosure Statement(s), PTO-1449, Paper No(s). _____

☐ Interview Summary, PTO-413

☐ Notice of Draftperson's Patent Drawing Review, PTO-948

☐ Notice of Informal Patent Application, PTO-152

--SEE OFFICE ACTION ON THE FOLLOWING PAGES--

Art Unit: 1111

DETAILED ACTION

This Office action is in response to the amendment filed July 21, 1997 in which claims 2-4, 6-8 and 13 were canceled and claims 1, 9, 12 and 14 were amended.

Response to Amendment

1. The Affidavit and Declaration filed on July 21, 1997 under 37 CFR 1.131 are sufficient to overcome the reference.

Claim Rejections - 35 USC § 112

2. Claims 1, 12 and their dependents are rejected under 35 U.S.C. 112, first paragraph, because the specification, while being enabling for the metal binder being a metal alloy containing Cr and at least one of Ni, Co or mixtures thereof, i.e., Ni-based superalloys and Co-based superalloys or mixtures thereof, does not reasonably provide enablement for every "high temperature, high strength and oxidation resistant bonding metal". The specification does not enable any person skilled in the art to which it pertains, or with which it is most nearly connected, to make and/or use the invention commensurate in scope with these claims.

3. Claims 1, 5, 9, 12, 14, 15 and 16 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

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Claims 1, 9, 12, 14, 15 and 16 are rejected because the language "selected from the group consisting essentially of" is improper Markush language. The term "essentially" should be deleted.

In claims 1 and 12, the language "high temperature and high strength" is indefinite. The term "high" is a relative term which has no comparative value.

In the last line of claims 1, 12, 14, 15, 16, line 8 of claim 1, and line 6 of claim 12, "mixture" should read -- mixtures --.

Claims 5 and 14 are rejected because they are dependents of canceled claims.

Claim 9 is rejected because there is no antecedent support for "said metal binder". It is suggested that the language -- bonding metal -- be used instead.

Claim Rejections - 35 USC § 103

4. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

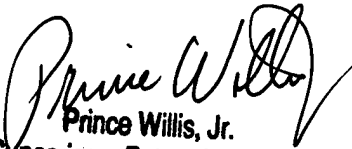
5. Claims 1, 5, 9-12 and 14 are rejected under 35 U.S.C. 103(a) as being unpatentable over Toyota.

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Toyota teaches a lubricated composite comprising metal bonded chromium oxide and calcium fluoride and barium fluoride solid lubricants. The bonding metal is a Ni-Cr superalloy (see abstract in its entirety).

Toyota teaches the limitations of the claims other than the specific proportions. However, no unobviousness is seen in this difference because it is the examiner's position that the ratios taught by Toyota encompass the claimed weight percentages of the instant claims.

6. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Cephia Toomer whose telephone number is (703) 308-2509.


Prince Willis, Jr.
Supervisory Patent Examiner
Patent Examining Group 110

cdt/08786360.2

October 9, 1997